NEVAMERICA

US DEPARTMENT OF ENERGY FIELD OPERATIONS PROGRAM

2002 Columbia ParCar 2-Passenger

VEHICLE SPECIFICATIONS

PURPOSE-BUILT VEHICLE
Base Vehicle: 2002 Columbia ParCar 2-Passenger NEV
VIN: 5FCLN24A021000248
Seatbelt Positions: Two
Features As Tested:
- Rear Wheel Drive
- Four-Wheel Drum Brakes
- Two-point Safety Belts
- Speedometer
- Odometer
- State-of-charge meter
- Back-up Alarm
- Overdrive

BATTERY
Manufacturer: Trojan
Type: T-105 Flooded Lead Acid
Number of Modules: 8
Weight of Modules: 28.0 kg
Weight of Pack(s): 224.0 kg
Pack(s) Location: Under Front Seat
Nominal Module Voltage: 6V
Nominal System Voltage: 48V
Nominal Capacity (C/2): 146 Ah

WEIGHTS
Design Curb Weight: 1162 lb
Delivered Curb Weight: 1205 lb
Distribution F/R: 40/60 %
GVWR: 1910 lb
GAWR F/R: 570/1340 lb
Payload: 750 lb[2]
Performance Goal: 400 lb

DIMENSIONS
Wheelbase: 64.0 inches
Track F/R: 38.0/37.5 inches
Length: 92.5 inches
Width: 44.3 inches
Height: 71.0 inches
Ground Clearance: 4.4 inches
Performance Goal: 5.0 inches

CHARGER
Location: Off board (portable)
Type: Conductive
Input Voltages: 120 VAC

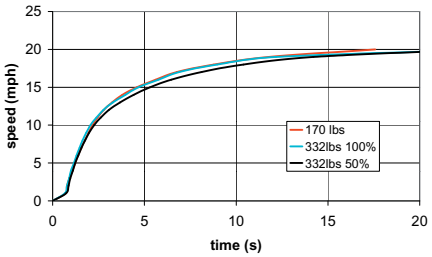
TIRES
Tire Mfg: Kenda
Tire Model: K-353
Tire Size: 5.7 x 8 19.0 OD x 6.0 Section Width
Tire Pressure: 35-50 psi
Spare Installed: No

TEST NOTES:
1. Vehicle was operated at maximum attainable speed until 18 mph could no longer be maintained.
2. As delivered payload was 707 Lbs.
3. Vehicle was removed from program for one 24 hour period to replace rear axle (NCR NTP-005-00248-003).
4. Optional feature.
5. Average handling time was determined by comparing 10 NEVS that were enrolled during the first NEVAmerica Program

This vehicle meets all EV America Minimum Requirements listed on back.
Values in red indicate the Performance Goal was not met. • All Power and Energy Values are DC unless otherwise specified.

PERFORMANCE STATISTICS

Acceleration



Acceleration (0-20 mph) @ 332 lbs Payload
At 100% SOC: 22.9 seconds
At 50% SOC: 22.1 seconds
Performance Goal: 6.0 seconds

Maximum Speed @ 170 lbs Payload
(FMVSS 49 CFR 571.500 S5.a)
At 100%: 21.6 mph
Performance Goal: ≤ 25 mph

Maximum Speed @ 332 lbs Payload
At 100% SOC: 21.6 mph
At 50% SOC: 21.8 mph

At Maximum Speed Range[1]
Range: 52.9 miles
Energy Used: 6.34 kWh
Average Power: 2.65 kW
Efficiency: 119.8 Wh-DC/mile
Specific Energy: 28.3 Wh/kg

Braking From 20 mph
Controlled Dry: 19 feet
Controlled Wet: 24 feet
Panic Wet: 18 feet
Course Deviation: 0.0 feet

Handling
Average time: 84.1 seconds
Average NEV Time[5]: 77.3 seconds

Gradeability (Calculated)
Maximum Speed @ 3%: 17.0 mph
Maximum Speed @ 6%: 13.9 mph
Maximum Grade: 30.0 %

Charging Efficiency:
Efficiency: 133 Wh - AC/mi
Energy Cost: @ $0.10/k Wh: $0.013

Charger
Max Ground Current: <0.01 mA
Max Battery Leakage: <0.01 MIU
Max DC Charge Current: 21 A
Max AC Charge Current: 11.8 A
Peak Demand: 1173 W
Time to Recharge: 11.3 hours
Performance Goal: 100% SOC within 12 hours